

The Marine Resiliency Study

A study of Risk and Resilience for Post-Traumatic Stress Disorder

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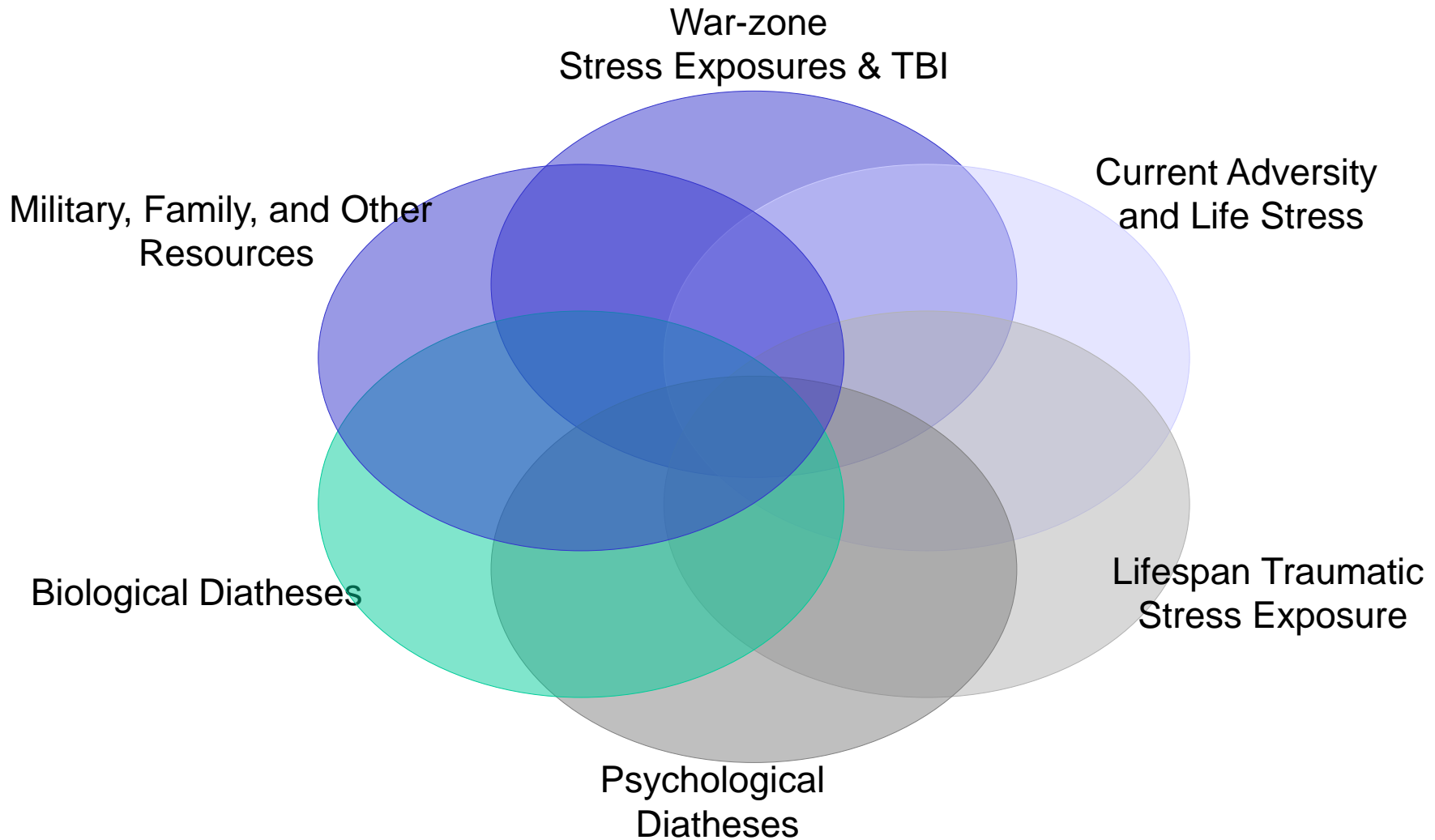




MRS Innovations and Advantages

- Large (2600) prospective longitudinal study
- Marine Corps / Navy collaboration
 - Charged with generating actionable recommendations for reducing risk
- Multi-systemic
- Outcome = Adaptation over time
- PTSD evaluated with clinical interview
- Rich set of predictors

The Complex Causes of Combat and Operational Stress Injury and Illness





Psychosocial and Exposure Variables

Personality and Cognitive Characteristics:

Trait Resilience: (RSES)

Trait Dissociation (DES)

Traumatic Brain Injury Screen

Personal History:

Lifespan Trauma (LEC)

Childhood Trauma Questionnaire

Prior Deployments

Demographics (Age, Rank...)

State Coping Repertoire:

Avoidant Coping (Brief Cope)

State Resilience (CDR)

State Positive and Negative Affectivity (PANAS)

Social Support:

Deployment Risk and Resilience Inventory (DRRI)

Unit Cohesion

Post-deployment Support

WRAIR Cohesion Scales

Interpersonal Support

Non-Military Sources of Stress:

DRRI Life and Family Concerns

War Zone Exposure:

DRRI

Deployment Concerns

Deployment Environment

Combat Exposure

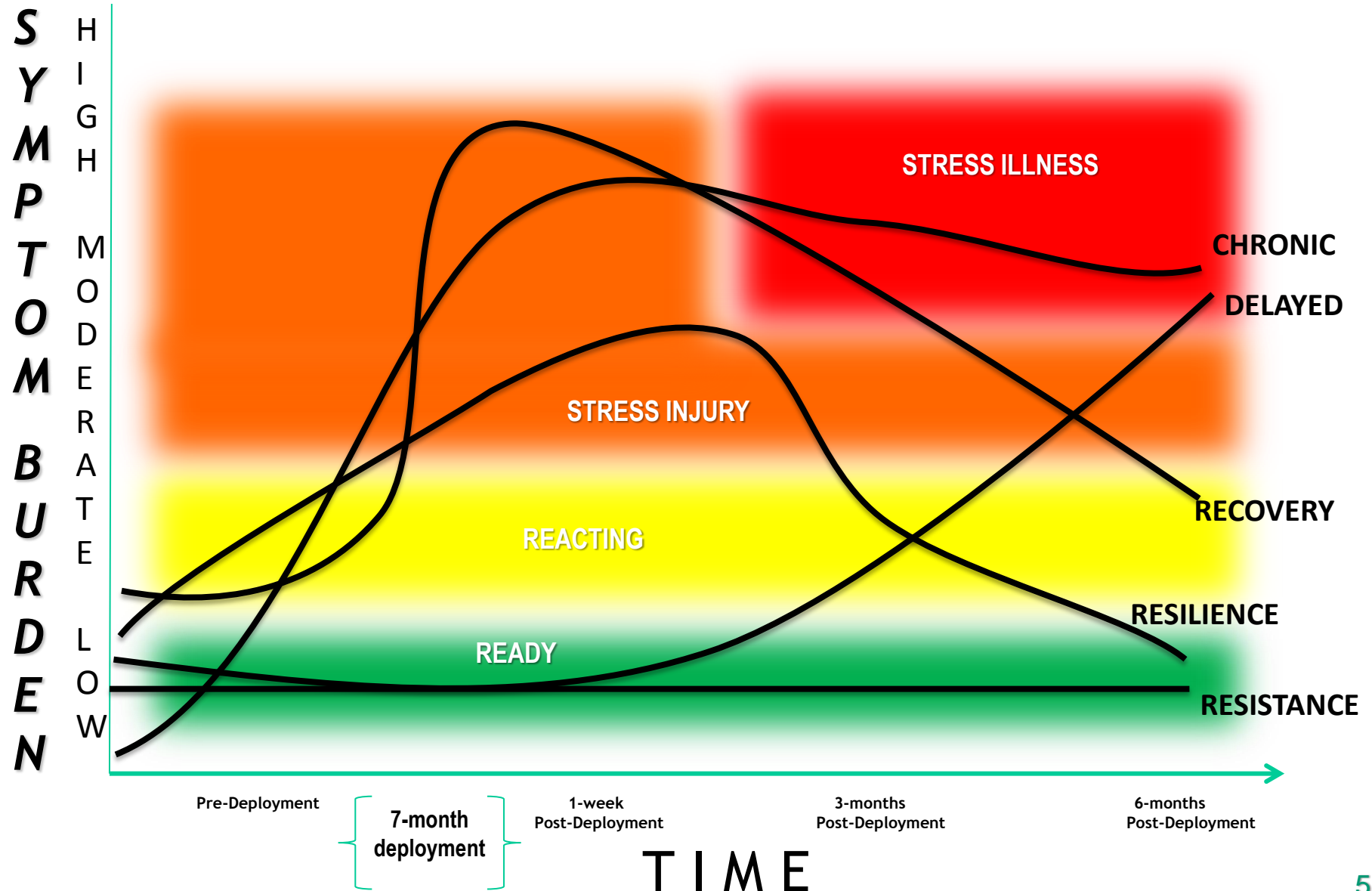
Post-Battle Experiences

Moral Injury Events Scale

Traumatic Loss

Peritraumatic Dissociation

Hypothetical Trajectories of Adaptation To COS





MRS Demographics

Caucasian	82.8%
High School	65%
Post-High School	35%
Married	40%
First Deployment	52%
Prior Deployments (Mode)	1
Age	M=23 (Range:18-48)
Rank: E1-E3	63%
Rank: E4-E5	29%
Rank: E6-E9	5%
Rank: O1-O5	2%

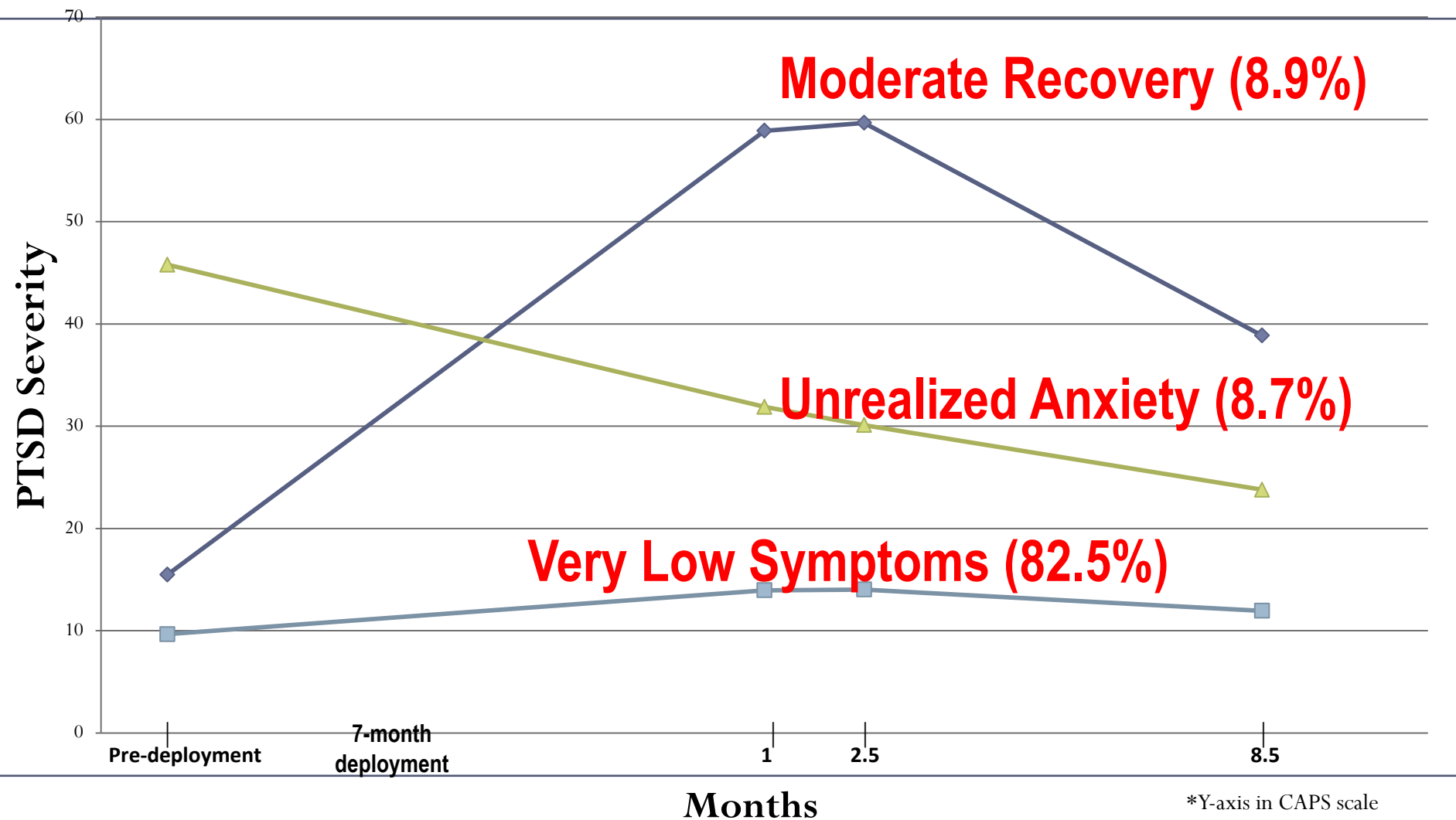
Signs of Robust Mental Health

	Time Point			
	0	1	2	3
Beck Anxiety Inventory	6.62	5.28	4.83	4.50
Beck Depression Inventory	5.62	5.64	5.20	4.81
Clinician Administered PTSD Scale	14.02	N/A	19.54	17.73
PTSD Checklist	22.20	27.47	24.93	24.30

*By time point, there are a high % of zero scores on BAI (23.2/33.6/40.8/41.5), BDI (27.3/26.2/32.1/31.9), and PCL (38.3/24.7/28.3/33.1).

MRS Trajectories

Latent Class Growth Analysis



*PTSD prevalence per time point: 4.5/10.8/7.5/6.4

Multinomial Logistic Regression and Relative Weights Analysis

Moderate Recovery vs. Low Symptoms

- ***War-Zone Stress Exposure (33%)***
 - **Deployment Environment (11%)**
 - **Combat Exposure (5%)**
 - **Post-Battle Experiences (7%)**
 - **Traumatic Loss (10%)**
- ***Peritraumatic Dissociation (23%)***
- ***State Coping and Management Repertoire (17%)***
 - **Avoidant Coping**

44% Variance explained



Variables Not Germane?

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Trait Dissociation (DES)

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Multinomial Logistic Regression and Relative Weights Analysis

Moderate Recovery? vs. Unrealized Anxiety (41.6%)

- ***War-Zone Stress Exposure (20.5%)***
 - **Combat Exposure**
- **Peritraumatic Dissociative Experiences (21.1%)**

Unrealized Anxiety vs. Low Symptoms (69.5%)

- ***Personality and Cognitive Characteristics (15.4%)***
 - **Dissociative Experiences**
- ***Non-Military Sources of Stress (23.3%)***
 - **Life events checklist**
- ***State Coping and Management Repertoire (20.4%)***
 - **Avoidant Coping**
- ***Peritraumatic Dissociation (10.4%)***

Thank You

